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#### REMARKS

The Office Action of August 13, 2007 has been carefully reviewed and reconsideration is respectfully requested. The Examiner's withdrawal of the species election requirement is acknowledged and appreciated. The Examiner also made inquiries that relate to the issue of public use or on-sale activity raised in this application, and which are addressed in further detail below. The Examiner objected to claims 8-11 under 37 C.F.R. 1.75(c) and claims 2, 15, and 19 under 35 U.S.C. § 112. Claims 2, and 8-11 have been canceled and claim 1 has been amended such that claims 15 and 19 now properly depend from claim 1. In addition, the Examiner rejected claims 1-80 on the ground of nonstatutory obviousness-type double patenting. Furthermore, the Examiner rejected claims 1, 3, 4, 8-19, and 29 under 35 U.S.C. § 102 as being unpatentable over *Corbett et al.* (EP O 184 288). Claims 1, 3, 4, 8-29, 39-49 and 75-77 were rejected under 35 U.S.C. § 103(a) as being obvious in view of *Corbett et al.* (EP O 184 288) alone, and claims 1, 3, 4, 8-49, 73, and 75-77 as being obvious over *Corbett et al.* in view of *Matsuhita* (Chem Abstr. 119:88906x) and *Zoelde* (Chem. Abstr. 109:185488a). The Examiner also rejected claims 1, 3, 4, 8-29, 39-59 and 75-77 as being obvious over *Corbett et al.* (EP O 184 288) in view of *Misato*, U.S. Pat. No. 3,873,700. Finally, claims 1, 3, 4-29, 39-49, 60-63 and 75-78 were rejected as being obvious over *Corbett et al.* (EP O 184 288) in view of *Price*, U.S. Pat. No. 4,587,123, and claims 1, 3, 4-29 39-49, 64-72 and 75-78 were rejected over *Corbett et al.* (EP O 184 288) in view of *Sakharova*, U.S. Pat. No. 4,826,682.

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Applicant notes that the Examiner did not reject claim 2 under 35 U.S.C. §§ 102 or 103.

Applicant also brings to the attention of the Examiner the divisional application Serial No. 11/931,686, filed October 31, 2007 by the Applicant containing the claims previously subject to the restriction requirement, that has been subsequently withdrawn by the Examiner. It is Applicant's intention to cancel such claims presented in the divisional application upon their allowance in the present application.

#### *PUBLIC USE AND ON-SALE*

With respect to the public use and on-sale activity raised by the Examiner in this application, Applicant submits the following answers to the Examiner's inquiries, which are supported by the Declaration of Stephen Tvedten (attached as Appendix A).

(a) Did Applicant publicly use or sell or offer the claimed invention for sale before the filing of the instant application, and if so, was the public use or sale performed more than one year before the filing of the instant application?

Answer: No. The first experimental use of the invention occurred in 1994, but was not publicly disclosed before the effective filing date of the invention of the instant application, January 9, 1997. The details of

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this experimental use are described in detail  
in Mr. Tvedten's declaration.

(b) If Applicant publicly used or sold or offered the claimed invention for sale prior to filing of the instant application, what were the specific circumstances of the use, sale or offer for sale?

Answer: See Answer to (a).

(c) The protest filed October 21, 1999, contains what appears to be marketing literature for a product named "Kleen Kill" from a firm named Get Set, Inc. The literature clearly discloses the use of protease and other enzymes for killing pests. Applicant is required to answer several questions regarding this literature:

(1) Is Applicant aware of the date of publication and/or sale of the Kleen Kill marketing literature, and if so what is that date?

Answer: No. Kleen Kill was never sold by the Applicant as an agent for killing pests. The "label" provided by Mr. Stoddard was never used. The invention claimed, a method for exterminating pests, was not commercially sold before January 9, 1997, the effective

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filing date of the instant application, and the marketing literature was prepared after this date.

(2) Did Applicant use the Kleen Kill product to kill pests according to the methods indicated in the literature prior to filing of this patent application?

Answer: No. However, the Applicant did use an enzyme-based pesticide on an experimental basis only before the effective filing date of the instant application.

(3) If Applicant is aware, what are the ingredients of the Kleen Kill product?

Answer: Various enzymes and surfactants.

(4) Was the Kleen Kill product for sale, i.e., available commercially, more than one year prior to the filing of this patent application?

Answer: The ingredients, as shown in the cited prior art, were publicly known since 1971. However, these ingredients were only available as a cleaner, not as a pesticide.

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The effective filing date of this application is January 9, 1997. As set forth in Mr. Tvedten's declaration, it is apparent that there is no credible evidence of acts of public use or on-sale activity more than one year prior to this date that would be sufficient to in any way render this application invalid under 35 U.S.C. § 102(b). Accordingly, Applicant respectfully submits that the issues raised by the public use protest have been satisfied and that the public use protest is without merit.

#### *EXAMINER'S OBJECTIONS*

The Examiner objected to claims 8-11 under 37 C.F.R. 1.75(c) and claims 2, 15, and 19 under 35 U.S.C. § 112. Claims 2 and 8-11 have been canceled. In addition, the language of claim 2 has been added to claim 1. Consequently, claims 15 and 19 now properly depend from claim 1, thereby removing any objection related to an insufficient antecedent basis.

#### *DOUBLE PATENTING*

Claims 1-80 have been rejected on the ground of non-statutory obviousness-type double patenting as being obvious over the claims of U.S. Pat. No. 6,663,860. While Applicants disagree with the obviousness-type double patenting rejection of these claims, as Applicant submits that these claims are non-obvious over the claims of the '860 Patent, Applicant hereby submits a Terminal Disclaimer to overcome any obviousness-type double patenting rejection to expedite prosecution. Accordingly,

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Applicants submit that claims 1-80 are in condition for allowance.

**CLAIM REJECTIONS UNDER 35 U.S.C. § 102**

In the Office Action, the Examiner rejected claims 1, 3, 4, 8-19, and 29 under 35 U.S.C. § 102 as being unpatentable over *Corbett et al.* (EP O 184 288). For the reasons set forth below, Applicant respectfully requests reconsideration of this rejection and allowance of the pending claims.

All currently pending claims are dependent either directly or indirectly from claim 1. Thus, it follows that if claim 1 is allowable, all pending claims of the application are likewise allowable. Amended claim 1 recites a method for exterminating pests, including a first step of providing a composition comprising an enzyme component, comprising at least one protease. The enzyme component is in an amount of no more than 1% by weight of the composition, and a detergent component is included that is comprised of a surfactant and a detergent builder. The second step includes applying the composition to a pest. None of the cited references alone or in combination include the steps as set forth in amended claim 1, which now recites the limitations of claim 2, specifically that “the detergent component is comprised of a surfactant and a detergent builder.” As admitted by Examiner Prats, in his April 27, 2001 correspondence to Applicant regarding the parent case, the *Corbett et al.* reference does not disclose the use of a detergent builder in combination with a detergent containing enzyme to form the pesticides

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disclosed in the application. As claim 2 is not anticipated by nor obvious over any of the cited references, it follows that claim 1, which now incorporates the language of claim 3, is allowable. Accordingly, the previous rejection under 35 U.S.C. § 102 must be withdrawn.

Consequently, Applicant maintains that the remaining claims are likewise non-obvious by virtue of their dependency upon allowable claim 1. Accordingly, for the foregoing reasons, Applicant respectfully requests that pending claims 1-80 are in allowable condition and reconsideration and entry of a Notice of Allowance are earnestly solicited.

Respectfully submitted,

DECEMBER 7, 2007

/Steven L. Underwood/  
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SLU/BRC/ktr/dlc

# APPENDIX A



IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

Art Unit : 1651  
Examiner : F. Prats  
Applicant : Stephen L. Tvedten  
Appln. No. : 09/341,174  
Filing Date : August 20, 1999  
For : BIOLOGICAL PESTICIDE

Assistant Commissioner for Patents  
Washington, D.C. 20231

Dear Sir:

DECLARATION UNDER 37 C.F.R. § 1.132

I, Stephen L. Tvedten, declare and state as follows:

1. I am the applicant in the above-identified patent application and the inventor of the subject matter disclosed and claimed therein. I am also the President of Get Set, Inc.

2. I have been associated with the design, manufacture, and marketing of compositions containing an enzyme component and a detergent components. I am very familiar with the formulation of such solutions available.

3. I have reviewed and understand pending claims 1-13, 15-73, and 76-79, which stand rejected in my application.

4. I have reviewed the Office Action, Paper No. 11, mailed April 30, 2001, relating to my application, and particularly the Examiner's questions on public use and/or sale and the Examiner's position in rejecting claims 1-13, 15-73, and 76-79 as being unpatentable over *Corbett et al* (EP 0 184 288) *Kucera et al* (Biological Abstracts 70(4) :25985) and *Xie* (Chemical Abstracts 124(5) :48341t (1996)) in view of *Misato et al* (U.S. Pat. 3,873,700) and *Sakharova et al* (U.S. Pat. 4,826,682) and in further view of *Matsushita* (Chemical Abstracts 19(9):88906x (1993)), *Zoelde* (Chemical Abstracts 109(21):185488a (1988), and WO 91/19417.

5. The Examiner requested answers to the following questions:

(a) Did Applicant publicly use or sell or offer the claimed invention for sale before the filing of the instant application, and if so, was the public use

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or sale performed more than one year before the filing of the instant application?

Answer: No. The first experimental use of the invention occurred in 1994, but was not publicly disclosed before the effective filing date of the invention of the instant application, January 9, 1997. The details of this experimental use are described below.

(b) If Applicant publicly used or sold or offered the claimed invention for sale prior to filing of the instant application, what were the specific circumstances of the use, sale or offer for sale?

Answer: See Answer to (a).

(c) The protest filed October 21, 1999, contains what appears to be marketing literature for a product named "Kleen Kill" from a firm named Get Set, Inc. The literature clearly discloses the use of protease and other enzymes for killing pests. Applicant is required to answer several questions regarding this literature:

(1) Is Applicant aware of the date of publication and/or sale of the Kleen Kill marketing literature, and if so what is that date?

Answer: No. Kleen Kill was never sold by the Applicant as an agent for killing pests. The "label" provided by Mr. Stoddard was never used. The invention claimed, a method for exterminating pests, was not commercially sold before January 9, 1997, the effective filing date of the instant application, and the unused marketing literature was prepared after this date.

(2) Did Applicant use the Kleen Kill product to kill pests according to the methods indicated in the literature prior to filing of this patent application?

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Answer: No. However, I did use an enzyme based pesticide alternative on an experimental basis only before the effective filing date of the instant application.

(3) If Applicant is aware, what are the ingredients of the Kleen Kill product?

Answer: Various enzymes and surfactants.

(4) Was the Kleen Kill product for sale, i.e. available commercially, more than one year prior to the filing of this patent application?

Answer: The ingredients, as shown in the cited prior art, were publicly known since 1971.

However, these ingredients were only available as a cleaner, not as a pesticide.

6. I agree with the Examiner that *Corbett* does not disclose the use of a detergent builder in combination with the detergent-containing enzyme-based pesticides. *Corbett et al.* also teaches or suggests the utilization of a detergent component for use in the method as called for in my claims 1-13, 15-73, and 76-79.

7. I respectfully traverse the Examiner's position that it would have been obvious to one having ordinary skill in the art at the time of my invention to make the *Corbett et al.* compounds with a detergent. Although a detergent builder, silicates, per se, have previously been used with detergents, to my knowledge a surfactant and detergent builder have never been used to make a composition of any kind for exterminating pests, and particularly a composition containing at least one protease, and a detergent compound comprising a surfactant and a detergent builder. *Corbett et al.* does not teach one having ordinary skill in the art to combine a protease enzyme with a detergent composition containing a surfactant and a detergent builder as a composition useful in exterminating pests.

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8. Before my invention, I have not seen the use of a protease enzyme in combination with a compound comprised of a surfactant and a detergent builder, for any use.

9. As further evidence of the non-obviousness of my invention, my invention has enjoyed significant commercial success. More particularly, the manufacture and sale of such compositions for use according to the method defined in claims 1-13, 15-73, and 76-79 of my application met almost immediate commercial success. Sales have risen from nothing before 1998 up to about \$2 million in 2000 to about \$10 million projected for 2001, after the product was first commercially introduced in 1998 by my licensee, Ginesis Natural Products, under the name "Not Nice to Lice." Products useful in accordance with the method of my invention can be found on the shelves of Walgreen's, Meijer, and CVS, and many independent drug stores, and are expected to soon appear on the shelves of K-Mart, Wal-Mart, Long's, Albertsons, Osco, Eckert, Rite-Aid, and Rexall. Indeed, these products started with one (1) space on Walgreen's shelves for two (2) bottles to now three (3) spaces for ten (10) bottles. The commercial success of this product, and my invention, is nothing less than spectacular.

10. The commercial success of the method of claims 1-13, 15-73, and 76-79 of my application and as manufactured and sold by me is attributed to meeting a long felt need for an enzymatic pesticide alternative that is effective, yet safe.

11. After introducing the method and composition as defined in claim 1 of my application and its wide acceptance in the marketplace, particularly for use in buildings where people and animals congregate are particularly advantageous, others have copied my invention. For example, attached as Exhibit "A" is a copy of the packaging for an anti-lice shampoo from Nature's Best, a competitor. On information and belief, this enzymatic composition was introduced by Nature's Best after my invention appeared in the marketplace and is made in accordance with my claimed invention. Similarly, Lice-Be-Gone is a competitive product introduced by Robert Stoddard (the submitter of the public use protest) and Vicki Bishop in 1999 that is also in competition with the product for use according to my invention, Not-Nice-To-Lice, licensed to and sold by Ginesis.

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12. I have also reviewed the September 6, 1999 statement by Mr. Stoddard. Mr. Stoddard is now a competitor to my licensee's product, Not-Nice-To-Lice, for use in accordance with my invention. Mr. Stoddard is also a former employee of my company, Get Set, Inc. Mr. Stoddard has acknowledged to me on many occasions that I am the inventor of the instant invention.

13. In fact, Mr. Stoddard was present when his sister, Cynthia Stoddard-Fitzgerald, drafted a license in her offices between me and Ginesis Natural Products for the right to the manufacture of the composition for use in accordance with my present invention.

14. Before 1994, I conceived the idea of using enzymes and several synergistic compounds to exterminate pests. In 1994, I shared my idea, confidentially, with Robert Stoddard, then an employee in the Grand Rapids Public School System, and involved in pest management. Mr. Stoddard agreed to cooperate in an experimental program to evaluate the use of enzymes in pest extermination on a large scale.

15. Tests were run in the Grand Rapids Public School System from 1994 to 1996. Reports were prepared to evaluate the results. See attached Exhibit "B," a report from August 1996. I am not aware that the ingredients in the experimental "Super Clean" were ever publicly disclosed before the filing date of my invention.

16. After confirming the success of my invention in 1996, I filed the instant application on January 9, 1997.

17. None of the materials attached to Mr. Stoddard's "public use" disclosure in fact disclose my invention, and in fact confirm the ongoing experimental nature of the program. Indeed, there is no indication that the contents of or manufacturer of "Super Clean," the name for the experimental solutions, was ever disclosed.

18. The only limited, confidential disclosure in the materials submitted by Mr. Stoddard of the contents of "Super Clean" were in the Grand Rapids Public School Systems' Form IPM #4, which must be completed before any pesticide application is made in the Grand Rapids Public School System, even on an experimental basis. To my knowledge, this document was not published.

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19. In the Get Set letters, even Mr. Stoddard admits there is no mention of enzymes.

20. All materials dated after January 9, 1996 are irrelevant under 35 U.S.C. § 102(b), as events occurring less than one (1) year before the effective filing date of the instant application.

21. It is interesting to note that the "September 9, 1999" letter to "To whom it may concern" written by Nathan McCormick of the Grand Rapids Public School System (a known friend of Mr. Stoddard's) is dated three (3) days after Mr. Stoddard supposedly drafted and submitted his "public use" disclosure. The obviously contrived letter is not under oath. The contents of the letter drafted in 1999 related to purported events in 1994 are unreliable.

22. Similarly, the "September 14, 1999" to "Whom it may concern" written by Tom Llewelyn is dated eight (8) days after Mr. Stoddard supposedly drafted and submitted his "public use" disclosure. The obviously contrived letter is not under oath. The contents of the letter relating to purported events in 1994 are unreliable.

23. Similarly, the August 5, 1999 letter from George Dewberry is obviously contrived and self-serving.

24. The April 1994 inservice speeches allegedly given by Mr. Stoddard demonstrate only that "Super Cleaner" was publicly disclosed as a cleaning agent. There is no credible evidence that it was disclosed as an insecticide.

25. The MSDS for "Bacto-Zyme/Kleen Kill" in 1995 demonstrates only that for the experiments, an MSDS was prepared. "Kleen Kill" as a trademark was never used in relation to sale of product for use according to the method of my invention before the effective filing date of the invention.

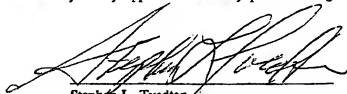
26. The November 1994 Grand Rapids Public School System newsletter only advises the use of "Super Clean" to kill insects and is completely consistent with the experimentation then underway. It does not disclose, teach, suggest, or offer for sale an enzyme in combination with a detergent component for exterminating pests.

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27. The Not-Nice-To-Lice product, the product sold by my licensee for use in accordance with my instant application, has been allowed as an Australian patent.

All statements made herein of my own knowledge are true and all statements made on information and belief are believed to be true; and these statements were made with the knowledge that willful false statements and the like so made are punishable by fine or imprisonment, or both, under Section 1001 of Title 18 of the United States Code and such willful false statements may jeopardize the validity of my application and any patent issuing thereon.

8/30/01  
Date

  
Stephen L. Tvedten

Nature's Best™

Enzyme  
Shampoo Kit  
Natural Formula

Rinses Away  
Lice, Body Lice,  
Ice and their Eggs  
Safely and Effectively.

BOTTLE FOR LESS  
NATURE'S BEST™

(118 ml)



100% Safe  
Non-Toxic  
No Medicines

Kill contact lice, (113 ml) shampoo  
large galled and comb  
and detailed instructions.

All Natural Enzyme Formula Shampoo

Rinses away lice and their eggs  
safely and effectively. No harsh  
irritating even the most sensitive skin.  
Works without the use of pesticides.  
Nature's Best™ can be used safely on  
children and adults as often as needed.  
Leaves for easy tangle free combing.

Contains No Harsh Chemicals,  
Irritants or Skin Irritants.  
100% Safe, Hypo-Allergenic, Non-Toxic.

Do not store above 120° F.  
Keep from freezing.

Information en Español adjuntas.



Please Recycle

Nature's Best Inc.  
2101 Terrace Drive  
Libertyville, IL 60048  
www.naturesbestenzyme.com

Lice Away Enzyme  
Shampoo Kit

Rinses Away Head Lice, Body  
Lice, Crab Lice and their Eggs  
Safely and Effectively.

IMPORTANT: READ WARNING BEFORE USING

**DIRECTIONS:** Apply Nature's Best™ Lice Away  
Enzyme Shampoo to dry hair, scalp or any  
other area affected by lice. Massage and  
massage into hair and any affected areas.  
Thoroughly. Allow Nature's Best™ to remain  
on affected area for 10 minutes. Use fine  
toothed comb to remove lice and eggs. Rinse  
areas thoroughly. Repeat combing with fine  
toothed comb to ensure any remaining lice and  
eggs are removed.

Nature's Best™ Lice Away Enzyme Shampoo  
contains a unique enzyme formula specifically  
designed to treat lice and their eggs safely and  
effectively from your hair. Lice are becoming  
resistant to pesticide shampoos, but will not  
become resistant to Nature's Best™. Can be  
used on children and adults. The most sensitive  
skin and can be used on the most sensitive  
body areas.

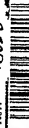
We at Nature's Best™ strive to bring our  
customers only the best in personal care,  
products and are committed to using only the  
best ingredients.

**NOTICE:**  
Nature's Best™ Lice Away Enzyme  
Shampoo is not a Pediculicide, and is not  
required to be approved by the Food and  
Drug Administration.

**ACTIVE INGREDIENTS:**  
Naturally occurring enzymes derived  
solely from insecticidal yeast strains.  
Other ingredients: And non toxic  
surfactants and solvents.

**WARNING:** For external use only.  
Protect eyes and avoid contact with  
eyes. If contact is made with eyes, rinse  
thoroughly with cool water. If skin  
irritation or infection develops,  
discontinue use and consult a  
physician. Keep out of reach of children.

Nature's Best™



LOT 30 1/05/14

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## **August Update of Inspections or Treatments @ Grand Haven Area Public Schools**

07/02/96 - Met with Ted, no problems. Seminar late August, will need tool kits. 08/02/96 - Treated ants by office with talcum powder.

### **Mary A. White School**

08/01/96 - Mouse droppings in store room. Installed 1 set of cards in store room & hallway to cover kitchen area.

### **Grand Haven Senior High School**

08/01/96 - No reported problems. All cards in place and fine. Gave Vern 4 extra cards.

### **Robinson Elementary School**

08/01/96 - Stan has been putting borax down and has not seen any ants or stink bugs since school has been out.

### **Grand Haven Junior High School**

08/01/96 - Set up and repositioned new and old cards. Recommended mice poison be removed.

### **Griffin Elementary School**

08/01/96 - 1 card was gone - replaced with new zone. Recommend that macaroni artwork be removed/discarded. Make sure food is stored in glass, heavy plastic or metal containers.

### **Rosy Mound Elementary School**

08/01/96 - Original set of cards down, replaced with larger area. Spot treated ants in Counselor's office and store room with borax. Need enzymes and DOT here.

### **Peach Plains Elementary School**

08/01/96 - Need enzymes here. No reported problems. We will set up a new zone of cards.

### **Ferry Elementary School**

08/01/96 - We will need to screw brackets to wall. Gave DOT. Still has ants. Cards were down, we redid cards. Also needs enzymes.

### **Central Elementary School**

08/01/96 - Need enzymes and DOT. Had ants - but has not seen for 3 months. All cards intact. Yellow jacket traps needed. Have someone screw brackets to wall.

### **Ferrysburg Elementary School**

08/01/96 - Needs enzymes and DOT. Has a lot of ants. Both zones are missing cards. We redid cards.

### **Lake Hill Elementary School**

08/01/96 - Problem with stink bugs, usually when school starts, not now. Cards down or missing, we redid cards.

